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Hickman Palermo Truong & Becker LLP
1600 Willow Street
San Jose, CA 95125-5106

| EXAMINER | |
|---|---|
| BATES, KEVIN T | |

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Please find below and/or attached an Office communication concerning this application or proceeding.

| Office Action Summary | Application No. | Applicant(s) | |
|---|---|---|---|
| | 09/675,980 | ZAVALKOVSKY ET AL. | |
| | Examiner | Art Unit | |
| | Kevin Bates | 2155 | |

*-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --*

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

1)☒ Responsive to communication(s) filed on *05 July 2005*.

2a)☒ This action is **FINAL**. 2b)☐ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

4)☒ Claim(s) *1-65* is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1-65* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

**Application Papers**

9)☐ The specification is objected to by the Examiner.

10)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

12)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☐ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

1) ☐ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) Paper No(s)/Mail Date _____.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____.
5) ☐ Notice of Informal Patent Application (PTO-152)
6) ☐ Other: _____.

## DETAILED ACTION

This Office Action is in response to a communication made on July 5, 2005.

Claims 1, 5, 9, 13, 14, 24, 41, and 58 have been amended.

Claims 1-65 are pending in this application.

### *Claim Rejections - 35 USC § 102*

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

> A person shall be entitled to a patent unless –
>
> (e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

**Claims 1, 3, 5, 7, 9, 11, 13-17, 19-20, 24-25, 27-28, 31-34, 36-37, 41-42, 44-45, 48-51, 53-54, 58-59, 61-62, and 65 are rejected under 35 U.S.C. 102(e) as being anticipated by Pandya (6671724).**

**Regarding claims 1, 5, 9, 13, 14, 24, 41, and 58**, Pandya teaches a method for dynamically adapting packets of data in a packet-switched network based on bandwidth information within the network (Column 14, lines 52 – 59, where the network checks the bandwidth information achieved by the network and dynamically alters the bandwidth allowances for the applications connected to the network), comprising the computer-implemented steps of:

receiving a first group of one or more packets of a data flow from the network (Column 8, lines 47 – 55, where the network receives certain types of applications and judges the service level that type of application will need and should be granted);

marking a first group of one or more packets of a data flow with a first behavioral treatment value (Column 2, lines 33 – 36, where the packet is marked with a priority value that shows the network how it should handle that packet), wherein the first behavioral treatment value directs devices within the network to treat the first group of one or more packets with a first quality of service treatment (Column 11, lines 41 – 45; lines 55 – 65; where the priority level that the packet got marked with decides how the router or network node acts upon the packet, using multiple queues for each priority value);

transmitting the first group of one or more packets of said data flow in the network (Column 15, lines 4 – 7, where once the priority is given and the bandwidth is allocated the applications are monitored by the agents to use their fair share of bandwidth);

determining an achieved flow bandwidth for the data flow based on data traffic within the network (Column 15, lines 46 – 50, where each agent reports the currently used bandwidth of each user application and the priority value);

determining a second behavioral treatment value based on the achieved flow bandwidth for the data flow within the network (Column 14, lines 54 – 64; Column 15, line 59 – Column 16, line 7 where the traffic control module re-calculates the bandwidth

allocation for each agent depending on the priorities and bandwidth requirements of those agents);

receiving a second group of one or more packets of said data flow from the network (Column 15, lines 1 – 9, where the reconfigured bandwidth is used to route the received data packets and flows after the re-allocation);

marking a second group of one or more packets of said data flow with said second behavioral treatment value, wherein the second behavioral treatment value directs devices within the network to treat the second group of one or more packets with a second quality of service treatment (Column 15, lines 1 – 10, where the re-allocated priorities and newly configured bandwidths are part of the new system policy); and

transmitting the second group of one or more packets of said data flow in the network (Column 15, lines 4 – 7, where once the priority is given and the bandwidth is allocated the applications are monitored by the agents to use their fair share of bandwidth).

**Regarding claims 25, 42, and 59**, Pandya teaches a method for performing packet marking comprising the computer implemented steps of:

defining an initial set of Quality of Service (QoS) values for coloring packets within a plurality of data flows (Column 2, lines 33 – 36, where the packet is marked with a priority value that shows the network how it should handle that packet), wherein each of the QoS values indicates an allocation of bandwidth (Column 11, lines 41 – 45; lines 55 – 65; where the priority level that the packet got marked with decides how the router or network node acts upon the packet, using multiple queues for each priority value);

coloring a first group of one or more packets of a given data flow selected from the plurality of data flows(Column 11, lines 41 – 45; lines 55 – 65; where the priority level that the packet got marked with decides how the router or network node acts upon the packet, using multiple queues for each priority value) without regard to an achieved flow bandwidth), by at least

communicating the initial set of QoS values to each of one or more edge differentiated services domain nodes that are located at one or more edges of a differentiated services domain (Column 8, lines 47 – 55, where the initial bandwidth/ service level is based on the required service level based on the type of application), and;

the one or more edge differentiated services domain nodes using one or more of the initial set of QoS values to color the first group (Column 11, lines 41 – 45; lines 55 – 65; where the priority level that the packet got marked with decides how the router or network node acts upon the packet, using multiple queues for each priority value);

estimating traffic bandwidth within the network based on bandwidth information corresponding to a current traffic pattern of the network, wherein the traffic bandwidth estimated includes an achieved flow bandwidth for the given data flow (Column 14, lines 54 – 64; Column 15, line 59 – Column 16, line 7, where the traffic control module re-calculates the bandwidth allocation for each agent depending on the priorities and bandwidth requirements of those agents);

determining an updated set of QoS values for coloring packets within the plurality of data flows, based on the traffic bandwidth estimated (Column 15, lines 46 – 50,

where each agent reports the currently used bandwidth of each user application and the priority value), wherein the updated set of QoS values provide lower levels of service than other available choices of QoS values, and wherein the updated set of QoS values provide a high enough level of service to accommodate the traffic bandwidth estimated (Column 21, lines 17 – 28, where the system makes sure that the application is guaranteed to have the minimal amount of bandwidth in order to function);

coloring a subsequent group of one or more packets of the given data flow with the one or more of updated set of QoS values by at least communicating the updated set of QoS values to each of one or more edge differentiated services domain nodes, and the one or more edge differentiated services domain nodes using one or more of the updated set of QoS values to color the subsequent group (Column 15, lines 1 – 10, where the re-allocated priorities and newly configured bandwidths are part of the new system policy); repeating the steps of estimating traffic bandwidth,

determining an updated set of QoS values, and coloring a subsequent group multiple time, therein tuning the network on an ongoing basis (Column 14, lines 59 – 64).

**Regarding claims 3, 7, and 11,** which depend on claims 1, 5, and 9, respectively, Pandya teaches the steps of determining packet flow characteristics of the first group of one or more packets of a data flow (Column 12, lines 15 – 29); and determining the second behavioral treatment value based on the available bandwidth within the network and the packet flow characteristics of the first group of one or more

packets of a data flow (Column 14, lines 54 – 64; Column 15, lines 1 – 10; Column 16, lines 7 – 19).

**Regarding claims 4, 8, and 12**, which depend on claims 1, 5, and 9, respectively, Pandya teaches the steps of establishing a Quality of Service (QoS) policy for applying a per-hop-behavior treatment for forwarding packets within a flow in said network; and generating the first behavioral treatment value based on the established QoS policy (Column 2, lines 26 – 40; Column 7, lines 40 – 58; Column 9, lines 32 – 35; Column 11, lines 36 – 46, where the agents are located at the nodes and apply the QoS policy).

**Regarding claims 15, 32, and 49**, which depend on claims 1, 5, and 9, respectively, Pandya teaches that the first behavioral treatment is determined without regard to the achieved flow bandwidth (Column 11, lines 41 – 45; Column 11, lines 55 – 65; Column 13, lines 35 – 41).

**Regarding claims 16, 33, and 50**, which depend on claims 1, 5, and 9, respectively, Pandya teaches that the second behavioral treatment is a behavioral treatment that provides a lower level of service than other available choices of behavioral treatments; and wherein the second behavioral treatment provides a high enough level of service to accommodate the achieved flow bandwidth (Column 14, lines 59 – 64).

**Regarding claims 17, 34, and 51**, which depend on claims 1, 5, and 9, respectively, Pandya teaches the second behavioral treatment is a behavioral treatment

that provides a minimum level of service that is a sufficient level of service to accommodate the achieved flow bandwidth (Column 14, lines 59 – 64).

**Regarding claim 19, 36, and 53**, which depend on claims 1, 5, and 9, respectively, Pandya teaches repeating the step of determining the achieved flow bandwidth and steps that follow the step of determining the achieved flow bandwidth (Column 14, lines 59 – 64).

**Regarding claim 20, 37, and 54**, which depend on claims 1, 5, and 9, respectively, Pandya teaches repeating the step of determining the achieved flow bandwidth and steps that follow the step of determining the achieved flow bandwidth multiple times, therein enhancing efficiency of the network on an on going basis (Column 14, lines 59 – 64).

**Regarding claims 27, 28, 44, 45, 61, and 62**, which depend on claims 1, 24, 5, 41, 9,and 58 respectively, Pandya teaches that the data flow is associated with only one behavioral treatment at any given time (Column 11, lines 35 – 46).

**Regarding claims 31, 48, and 65**, which depend on claims 1, 5, and 9, respectively, Pandya teaches that determining the second behavioral treatment is in response to a determination of achieved flow bandwidth resulting form the determining of the achieved flow bandwidth (Column 14, lines 54 – 64; Column 15, lines 1 – 10; Column 16, lines 7 – 19).

***Claim Rejections - 35 USC § 103***

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

**Claims 2, 6, 10, 18, 26, 35, 43, 52, and 60 are rejected under 35 U.S.C. 103(a) as being unpatentable over Pandya in view of Koskelainen (6570851).**

**Regarding claims 2, 6, and 10**, which depend on claims 1, 5, and 9, respectively, Pandya teaches the step of marking a first group of one or more packets includes the step of storing indicator of QoS in each header of the first group of one or more packets of a data flow (Column 2, lines 33 – 36); the step of determining a second behavioral treatment value includes the step of determining a second QoS; and the step of marking a second group of one or more packets includes the step of marking the new QoS indicator in each header of the second group of one or more packets of a data flow (Column 14, lines 54 – 64; Column 15, lines 1 – 10; Column 16, lines 7 – 19),

Pandya does not explicitly indicate that those priorities are marked in the packets using differentiated services codepoint (DSCP) values.

Koskelainen teaches using DSCP values to control QoS agreements in a network (Column 4, lines 20 – 30).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to use Koskelainen's teaching of DSCP values to indicate to the network the QoS of the packets in Pandya's system in order to give the nodes a better indication about what type of packet they are dealing with and what QoS it needs to handle the packets.

**Regarding claims 18, 35, and 52**, which depend on claims 1, 5, and 9, respectively, Pandya teaches the step of marking the first group is performed by at least communicating the first behavioral treatment to a node located at a border of a domain; and wherein the step of marking the second group is performed by at least communicating the second behavioral treatment to the node (Column 14, lines 54 – 64; Column 15, lines 1 – 10; Column 16, lines 7 – 19).

Pandya does not explicitly indicate that those priorities are marked in the packets using differentiated services codepoint (DSCP) values and having the differentiated services at the nodes and domain.

Koskelainen teaches using DSCP values to control QoS agreements in a network (Column 4, lines 20 – 30) and having differentiated services at the nodes and domain (Column 4, lines 22 – 29; Figure 2, element 16).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to use Koskelainen's teaching of DSCP values to indicate to the network the QoS of the packets in Pandya's system in order to give the nodes a better indication about what type of packet they are dealing with and what QoS it needs to handle the packets.

**Regarding claims 26, 43, and 60**, which depend on claims 1, 5, and 9, respectively, Pandya teaches wherein the step of estimating traffic bandwidth further comprises the steps of defining one or more QoS policies that specify target bandwidth values and a range of possible services for each the plurality of data flows (Column 11, lines 36 – 46), wherein a given target bandwidth value is specified for the given data

flow (Column 15, lines 46 – 58), and wherein the given target bandwidth identifies a specific bandwidth that is desirous or required by the given data flow (Pandya, Column 11, lines 36 – 41); gathering information about the traffic bandwidth; and determining the traffic bandwidth based on the information gathered (Column 12, lines 15 – 29; Column 10, lines 1 – 11; Column 15, lines 23 – 28).

Pandya does not explicitly indicate that the initial set of QoS values is an initial set of Differentiated Services Codepoint (DSCP) values; wherein the updated set of QoS values is an updated set of DSCP values.

Koskelainen teaches that the initial set of QoS values is an initial set of Differentiated Services Codepoint (DSCP) values (Koskelainen, Column 4, lines 20 – 29); wherein the updated set of QoS values is an updated set of DSCP values (Column 4, lines 20 – 29).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to use Koskelainen's teaching of DSCP values to indicate to the network the QoS of the packets in Pandya's system in order to give the nodes a better indication about what type of packet they are dealing with and what QoS it needs to handle the packets.

**Claim 22, 39, and 56 are rejected under 35 U.S.C. 103(a) as being unpatentable over Pandya in view of Dillon (6473793).**

**Regarding claim 22, 39, and 56**, Pandya teaches the method of claims 1, 5, and 9, respectively.

Pandya does not explicitly indicate that the step of determining the achieved flow bandwidth is performed by at least checking a Transfer Control Protocol/ Internet Protocol (TCP/IP) window size and determining a value for the achieved flow bandwidth based on the TCP/IP window size.

Dillon teaches the idea of using the information in TCP/IP protocol to help enforce data rates in a network (Column 3, lines 41 – 58).

It would have been obvious to one of ordinary skill in the art at the time the invention was made because TCP is a common connection type in the internet and it can easily be throttled based on window size.

**Claim 23, 40, and 57 are rejected under 35 U.S.C. 103(a) as being unpatentable over Pandya in view of Bushmitch (5928331).**

**Regarding claims 23, 40, and 57**, Pandya teaches the method of claims 1, 5, and 9, respectively.

Pandya does not explicitly indicate that the step of determining the achieved flow bandwidth is based on reception quality feedback from a Real-Time Transport Protocol (RTP) receiver.

Bushmitch teaches that RTP information it associated with RTCP packets that have flow control and session management information about the flow (Column 6, lines 13 – 24).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to use RTP control feedback to learn all the information the that the network needs to know about the achieved bandwidth of the flow and also because

RTP deals with applications such as streaming data which keeping a QoS is more important.

**Claim 29, 30, 46, 47, 63, and 64 are rejected under 35 U.S.C. 103(a) as being unpatentable over Pandya in view of Haddock (6104700).**

**Regarding claims 29, 46, and 63**, Pandya teaches the method of claims 1, 5, and 9, respectively.

Pandya does not explicitly indicate that the achieved flow bandwidth is a percentage of the network bandwidth.

Haddock teaches that traffic flow can be measured according to the percentage of the maximum bandwidth that flow is using (Column 8, lines 1 – 15; Column 10, lines 51 – 67).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to use Haddock's teaching in Pandya's system in order to perform normalized calculation and not have to deal with the bit rate, just the percentage which leads to an easier to calculation QoS.

**Regarding claims 30, 47, and 64**, Pandya teaches the method of claims 1, 5, and 9, respectively.

Pandya does not explicitly indicate the second behavioral treatment results in the dataflow having a different achieved flow bandwidth, which is a different percentage of the network bandwidth.

Haddock teaches that traffic flow can be measured according to the percentage of the maximum bandwidth that flow is using (Column 8, lines 1 – 15; Column 10, lines 51 – 67).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to have Pandya's system of changing the behavior treatments to a different bandwidth allowance for each data flow and improve it by calculating the bandwidth allocations based on the percentage of the maximum bandwith as taught in Hoddock, in order to perform normalized calculation and not have to deal with the bit rate, just the percentage which leads to an easier to calculation QoS.

**Claims 21, 38, and 55 are rejected under 35 U.S.C. 103(a) as being unpatentable over Pandya in view of Ordanic (5751964).**

**Regarding claim 21, 38, and 55**, Pandya teaches the method of claims 1, 5, and 9, respectively.

Pandya does not explicitly indicate that the step of determining the achieved flow bandwidth is performed by at least estimating the achieved flow bandwidth based on Management Information Base (MIB) variables.

Ordanic teaches uses a network nodes MIB to inform a network controller on the statistics and performances of the data flows (Column 4, lines 33 – 42).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to use Ordanic's system of managing a heterogeneous system using standard protocols and MIB's in Pandya's system in case Pandya needs to further monitor nodes which are heterogeneous to the system.

***Response to Arguments***

Applicant's arguments filed July 5, 2005 about the Double Patenting Rejection have been fully considered and the double patenting rejection has been removed.

Applicant's arguments filed July 5, 2005 about the 35 U.S.C. 102 Rejection have been fully considered but they are not persuasive.

**Regarding claim 1:**

**A**. *The Applicant argues that the reference Pandya does not disclose marking a first and second groups of one or more packets of the same data flow with a first and second behavioral treatment values, where the first and second behavioral treatment values direct devices within the network to treat the first and second groups of packets with a first and second quality of service treatment, respectively.*

The examiner disagrees, the reference Pandya discloses first receiving a data flow and considering the needs of that flow in order to transport it according to the needs of the particular flow (Column 8, lines 47 – 55) and assigning that data flow with a priority value and routing the data flow according to the available bandwidth of the device so the devices in the network act on the packets according to the priority which allows the flow to reach the QoS requirements (Column 11, lines 41 – 43). After the reconfiguration of the network the system alters the priorities and bandwidth according the achieved network packet flow and enforces a new behavior for each flow based on the configured priority and bandwidth (Column 15, lines 3 – 8) while ensuring that the new achieved bandwidth meets the minimum requirements for the particular data flow

(Column 21, lines 17 – 22). So Pandya does disclose the first and second behavior value with a combination of the allocated bandwidth and the priority value of the packets and the network routes the data flows according to those priority values, policies and bandwidth allocation.

**B**. *The applicant argues that the management of behavior values is located within a device which an agent executes, and the system does not inform other devices in the network to treat the packets with a particular quality of service treatment.*

The examiner disagrees, the reference Pandya discloses in Column 6, lines 49 – 55, that there are many agents located in network devices and each agent is configured to enforce system polices such as QoS requirements for data flows in the network system.

**C**. *The Applicant argues that the agent in the Pandya references does not mrak groups of packets with any information because the agents are located between the application and transport layers of the device on which the agent executes meaning that there is no need to mark the packets because all network traffic management has purportedly been accomplished before the packets are transmitted in the network.*

The examiner disagrees, in the reference Pandya, the packets are clearly assigned priority levels (Column 11, lines 41 – 43) and giving priority levels in one embodiment means marking the packet with the priority (Column 2, lines 33 – 36), thus in the network the packets are marked and they are marked because the packets travel to many different nodes in the network and each of those nodes have priority queues and agents that need that value to know how to treat the packet flow.

**D**. *The applicant argues that Pandya does not disclose any element of the system marking any packets with priority values before transmitting the packets in the network.*

The examiner disagrees, Pandya discloses that the priority value is assigned to the packet by the agent (Column 11, lines 41 – 43) and that the agents are located at multiple locations with in the network (Column 6, lines 49 – 55) and that the nodes have outgoing (Column 11, lines 36 – 38) and receiving (Column 12, lines 4 – 8) queues based on the priority and treatment values so the priority used within the network during transmission and more specifically deals with the incoming and outgoing transmission queues.

**E**. *The applicant argues that Pandya only uses priorities for a priority generated transmission queue and that once its in the network the priority value has no merit, thus not making other devices in the network consider the treatment value of the packets in the network.*

The examiner disagrees, as seen in the response to argument D, Pandya discloses that priority values are used for transmission and reception of packets in a device where an agent is located and because there are priority reception queues then other devices in the network must be taking the priority into account when they receive the marked packets.

**F**. *The applicant argues that Pandya does not determine an achieved flow of bandwidth of a data flow based on data traffic within the network.*

The examiner disagrees, Pandya discloses getting real time feedback from the network (Column 9, lines 32 – 35) including total network conditions (Column 9, lines 50 – 53) and particular data flows (Column 21, lines 17 – 22) so that the network can free up bandwidth for new core applications while maintaining the minimal requirements for data flows currently transmitting.

**G**. *The applicant argues that Pandya does not describe that its agents are capable of receiving packets from the network and re-transmitting the same packets in the network after marking them.*

The examiner disagrees, Pandya discloses that network agents can be in many configurations and devices, such as servers, routers, and hubs (Column 7, lines 34 – 39) and routers and hubs operate by receiving messages and packets at the input port and make routing decisions and enforce policies and then transmit the packets through the out port, now since the agent is in charge of assigning packets priorities and they are located in routers and hubs, then they must receive packets, mark priorities then send them into the network.

**Regarding claim 25:**

**H**. *The applicant argues that Pandya does not describe that its agents are executing on nodes at the edges of a differentiated services domain.*

The examiner disagrees, because as seen in the response to argument G, the agents are operating in routers and hubs and that the network in Pandya is a differentiated services domain (Column 8, lines 47 – 55) and since the agents are the

ones that assign the priorities and service levels to the packets of the data flows then the agents must be operating at the edge of the differentiated services domain.

***Conclusion***

Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Kevin Bates whose telephone number is (571) 272-3980. The examiner can normally be reached on 8 am - 4:30 pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Saleh Najjar can be reached on (571) 272-4006. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

KB
September 8, 2005

SALEH NAJJAR
PRIMARY EXAMINER